

AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions, and listings, of claims in the application:

1-11. (Canceled)

12. (Currently amended) A computer implemented method for building financial statements ~~from accounting data from an accounting system capable of producing a trial balance~~, the method comprising:

receiving an electronic file of accounting data ~~from an accounting system~~, the ~~accounting data including trial balance data~~ having a ~~number~~ plurality of accounts, wherein each account has a corresponding amount and an accounting direction for said amount;

computing an account balance resulting from one or more transactions, and each transaction is associated with more than one account and combines at least one debit and at least one credit;

grouping the accounts into one or more financial statement items, wherein each account is associated with only one financial statement item within any one financial statement and wherein said grouping is regardless of an account sequence;

computing a financial statement item balance for each financial statement item based on the associated accounts and their respective account balances;

grouping the financial statement items into one or more totals, wherein each total is based on preceding financial statement item balances; and

providing a financial statement that includes each financial statement item and its respective balance.

13. (Currently amended) The method of claim 12 further comprising:
providing, from a display of the financial statement, a first level of detail for a user selected financial statement item on said display, the first level of detail

including any accounts and respective account balances grouped into that financial statement item.

14. (Currently amended) The method of claim 13 wherein each account is assigned an accounting direction, and [[an]] said account balance is provided in parentheses if its direction is opposite the assigned accounting direction of that account.
15. (Currently amended) The method of claim 13 further comprising:
providing, from said accounts and respective account balances grouped into the user selected financial statement item on the display, a second level of detail for a user selected account on said display included in the selected financial statement item, the second level of detail including [[an]] said account balance and transactions associated with the account balance.
16. (Previously presented) The method of claim 15 wherein providing the second level of detail includes providing for at least one of form feeds and headers as required.
17. (Currently amended) The method of claim 15 further comprising:
providing, from said account balance and transactions associated with the account balance, a third level of detail for a user selected transaction included in the selected account on said display, the third level of detail including at least one debited account and a corresponding credited account associated with the selected transaction.
18. (Previously presented) The method of claim 12 wherein each financial statement item is assigned an accounting direction, and a financial statement item balance is provided in parentheses if its direction is opposite the assigned accounting direction of that financial statement item.

19. (Previously presented) The method of claim 18 wherein the assigned accounting direction of a financial statement item is based on a direction associated with a first grouped account of the financial statement item.
20. (Currently amended) The method of claim 12 wherein receiving accounting data ~~from an accounting system~~ further comprises at least one of:
 - reading trial balance data stored on a computer readable medium ~~by the accounting system~~; and
 - reading transactions stored on a computer readable medium ~~by the accounting system~~.
21. (Previously presented) The method of claim 12 wherein the method is integrated into accounting software.
22. (Previously presented) The method of claim 12 wherein the method is integrated into at least one of word processor software, spreadsheet software, and editing software.
23. (Currently amended) The method of claim 12 wherein providing a financial statement includes displaying at least one level of detail associated with any financial statement item balance to a user, wherein said displaying uses sub-lists of pointers.
24. (Currently amended) The method of claim 12 further comprising:
 - dynamically allocating central memory spaces for a plurality of doubly linked data structures for storing elements of the accounting data, wherein the allocating is performed for each data structure element and returning an individual central memory address called a pointer, the data structure being doubly linked by the storage of the pointer of a next element and the pointer of a previous element in the data structure element thereby enabling reading, organizing, and manipulation of the accounting data of the accounting system.
25. (Currently amended) The method of claim 12 further comprising:

dynamically allocating central memory spaces for a trial balance data structure for storing the accounts of the accounting data, and linking trial balance data structure elements ~~of the trial balance data structure~~ with a doubly linked list of pointers thereby allowing sub-lists of pointers to group the accounts into financial statement items; and

dynamically allocating central memory spaces for a financial statement data structure for storing the financial statement items, and linking financial statement data structure elements ~~of the financial statement data structure~~ with a doubly linked list of pointers thereby allowing sub-lists of pointers to group financial statement items into totals.

26. (Currently amended) The method of claim 25 wherein dynamically allocating central memory spaces for ~~[[a]]~~ the trial balance data structure further includes storing trial balance data into ~~[[the]]~~ trial balance data structure elements, ~~the~~ each of said trial balance data structure elements including a LINKTRANS field ~~for each account, the LINKTRANS field specifying an index of an associated pointer element in a~~ storing a corresponding LINK vector element sequential number, each ~~pointer~~ element of the LINK vector ~~indicating a being a central~~ memory address of a ~~corresponding element in the trial balance data structure~~ elements.

27. (Currently amended) The method of claim 25 wherein dynamically allocating central memory spaces for ~~[[a]]~~ the financial statement data structure further includes storing financial statement data structure elements ~~into the financial statement data structure~~, the financial statement data structure elements including a LINE type field for each element of the financial statement, each LINE type field specifying a type attributed to the corresponding financial statement data structure elements ~~element~~.

28. (Currently amended) The method of claim 27 wherein the type ~~types~~ that can be specified in the LINE type field include two types of balances provided in the financial statement, namely a financial statement item type and a total type.

29. (Currently amended) The method of claim 12 wherein grouping the accounts into one or more financial statement items includes using doubly linked sub-lists of trial balance data structure element pointers, the pointer of a first element of each of these lists of pointers being stored in a financial statement data structure.

30. (Currently amended) The method of claim 12 wherein grouping the financial statement items into one or more totals includes using doubly linked sub-lists of financial statement data structure element pointers, a pointer of a first element of each of these lists of pointers being stored in a financial statement data structure.

31. (Previously presented) The method of claim 25 further comprising:
maintaining a direction field in the trial balance data structure for each account, the
direction field specifying an accounting direction thereby enabling a user to
identify a transaction amount's effect on the corresponding account balance.

32. (Previously presented) The method of claim 12 further comprising:
generating a report including form feeds and headers as required for each page of the
report.

33. (Currently amended) The method of claim 12 further comprising:
dynamically allocating central memory spaces for a doubly linked transaction data
structure for storing transactions associated with the accounts, and linking the
transactions to their respective accounts.

34. (Currently amended) The method of claim 33 wherein dynamically allocating central memory spaces for ~~[[a]]~~ the doubly linked transaction data structure further includes storing transactions into the doubly linked transaction data structure, the doubly linked transaction data structure including a LINKCHART field ~~for each transaction line, the LINKCHART field specifying an index of an associated pointer in a~~ storing an associated LINK vector element, each ~~pointer of the~~ LINK vector element ~~indicating a~~ being a central memory address of a ~~corresponding element in the~~ trial balance data structure.

35. (Previously presented) The method of claim 34 wherein an accounting direction for each transaction amount is specified in a corresponding JOURNAL field included in the transaction data structure.

36. (Currently amended) The method of claim 34 wherein storing transactions into the doubly linked transaction data structure further includes dynamically allocating central memory spaces for ~~display line~~ displayline data structure elements, each ~~display line~~ of said displayline data structure ~~element~~ elements associated with a corresponding transaction data structure element.

37. (Currently amended) The method of claim 36 further comprising:
generating an account balance detail report using a doubly linked list of ~~display line~~ displayline data structure element pointers, thereby allowing sorted presentation of the transactions included in an ~~the~~ account balance detail report.

38. (Currently amended) The method of claim 34 wherein storing transactions into the doubly linked transaction data structure further includes linking each element of the transaction data structure to a corresponding element of ~~[[a]]~~ the trial balance data structure with a doubly linked sub-list of ~~display line~~ displayline data structure element pointers, a pointer of the first element of this list being stored in a trial balance data structure element.

39. (Currently amended) A computer implemented method for building financial statements ~~from accounting data from an accounting system capable of producing a trial balance,~~ the method comprising:
receiving an electronic file of accounting data ~~from an accounting system,~~ the ~~accounting data including trial balance data~~ having a plurality ~~number~~ of accounts, wherein each account has a corresponding amount and an accounting direction of said amount;

computing an account balance resulting from one or more transactions, and each transaction is associated with more than one account and combines at least one debit and one credit;

grouping the accounts into one or more financial statement items, wherein each account is associated with only one financial statement item within any one financial statement and wherein said grouping is regardless of an account sequence;

computing a financial statement item balance for each financial statement item based on the associated accounts and their respective account balances;

storing the financial statement items into a financial statement data structure, the financial statement data structure including a LINE type field for each line of a financial statement, each LINE type field specifying a type attributed to the corresponding financial statement line, with the types including a financial statement item type to designate financial statement items and a total type to designate financial statement items grouped into a total; and

providing the financial statement that includes each financial statement item and its respective balance.

40. (Currently amended) A computer implemented method for building financial statements ~~from accounting data from an accounting system capable of producing a trial balance~~, the method comprising:

receiving an electronic file of accounting data ~~from an accounting system~~, the ~~accounting data including trial balance data~~ having a plurality number of accounts, wherein each account has a corresponding amount and an accounting direction of said amount;

computing an account balance resulting from one or more transactions, and each transaction is associated with more than one account and combines at least one debit and one credit;

dynamically allocating central memory spaces for a trial balance data structure for storing the accounts of the accounting data, and linking trial balance data

structure elements of the trial balance data structure with a doubly linked list of pointers thereby allowing sub-lists of pointers to group the accounts into financial statement items, wherein each account is associated with only one financial statement item within any one financial statement;
computing a financial statement item balance for each financial statement item based on the associated accounts and their respective account balances;
dynamically allocating central memory spaces for a financial statement data structure for storing the financial statement items, and linking financial statement data structure elements of the financial statement data structure with a doubly linked list of pointers thereby allowing sub-lists of pointers to group financial statement items into totals; and
providing a financial statement that includes each financial statement item and its respective balance.

41. (Currently amended) The method of claim 40 wherein dynamically allocating central memory spaces for ~~[[a]]~~ the trial balance data structure elements further includes storing trial balance data into the trial balance data structure elements, the trial balance data structure elements including a LINKTRANS field for each account, ~~the LINKTRANS field specifying an index of an associated pointer element in a~~ storing a corresponding LINK vector element sequential number, each ~~pointer~~ element of the LINK vector ~~indicating a~~ being the central memory address of ~~a corresponding element in the~~ trial balance data structure elements.

42. (Currently amended) The method of claim 40 wherein dynamically allocating central memory spaces for ~~[[a]]~~ the financial statement data structure elements further includes storing financial statement items into the financial statement data structure elements, the financial statement data structure elements including a LINE type field for each line of the financial statement, each LINE type field specifying a type attributed to the corresponding financial statement line, the types including a financial statement item type and a total type.

43. (Currently amended) The method of claim 40 further comprising:

dynamically allocating central memory spaces for a doubly linked transaction data structure for storing transactions associated with the accounts, and linking the transactions to their respective accounts.

44. (Currently amended) The method of claim 43 further comprising:
optimizing allocation of central memory spaces for storing transactions included in the accounting data by storing a debited account and a corresponding credited account in a single element of the transaction data structure, as well as in an associated element of a ~~display line~~ displayline data structure element, thereby reducing the number of central memory spaces that must be allocated for storing transactions.

45. (Previously presented) The method of claim 44 further comprising:
maintaining a direction field in the trial balance data structure for each account, the direction field specifying which accounts have been identified as control accounts during the optimizing.

46. (Currently amended) The method of claim 44 further comprising:
computing a theoretical account balance during transaction checking processes; and displaying the theoretical account balance throughout the transaction checking processes, thereby eliminating a need to print reconciliation reports during these transaction checking processes to establish whether ~~[[an]]~~ said account balance has been reconciliated successfully.

47. (Currently amended) The method of claim 44 wherein dynamically allocating central memory spaces for ~~[[a]]~~ the doubly linked transaction data structure further includes storing transactions into the doubly linked transaction data structure, ~~[[the]]~~ each transaction data structure element including a LINKBANK field ~~for each transaction line, the LINKBANK field specifying an index of an associated pointer in a storing the associated~~ LINK vector element sequential number, each ~~pointer~~ element of the LINK vector ~~indicating a~~

being the central memory address of a corresponding element in the trial balance data structure elements.

48. (Currently amended) A method for organizing accounting data in data structures used for building financial statements ~~from accounting data from an accounting system capable of producing a trial balance~~, the method comprising:

receiving accounting data in an electronic file, the accounting data including a plurality of accounts, wherein each account has an amount and an accounting direction of said amount,

dynamically allocating central memory spaces for a trial balance data structure for storing accounts included in the accounting data, and linking trial balance data structure elements of the trial balance data structure with a doubly linked list of pointers thereby allowing sub-lists of pointers to group the accounts into financial statement items, wherein each account is associated with only one financial statement item within any one financial statement and has a ~~corresponding~~ computed account balance resulting from one or more transactions, and each transaction is associated with more than one account and combines at least one debit and at least one credit;

dynamically allocating central memory spaces for a financial statement data structure for storing the financial statement items, and linking financial statement data structure elements of the financial statement data structure with a doubly linked list of pointers thereby allowing sub-lists of pointers to group financial statement items into totals; and

storing financial statement items into the financial statement data structure, the financial statement data structure including a LINE type field for each line of a financial statement, each LINE type field specifying a type attributed to the corresponding financial statement line, the types including a financial statement item type and a total type.

49. (Currently amended) The method of claim 48 wherein dynamically allocating central memory spaces for ~~[[a]]~~ the trial balance data structure further includes storing trial

balance data into the trial balance data structure, ~~the~~ each of said trial balance data structure elements including a LINKTRANS field ~~for each account, the LINKTRANS field specifying an index of an associated pointer element in a~~ storing the corresponding LINK vector element sequential number, each ~~pointer~~ element of the LINK vector ~~indicating a~~ being the central memory address of ~~a corresponding element in the~~ trial balance data structure elements.

50. (Currently amended) The method of claim 48 further comprising:

dynamically allocating central memory spaces for a doubly linked transaction data structure for storing transactions associated with the accounts, and linking the transactions to their respective accounts.

51. (Currently amended) The method of claim 50 wherein dynamically allocating central memory spaces for ~~[[a]]~~ the doubly linked transaction data structure further includes storing transactions into the doubly linked transaction data structure, ~~the~~ each transaction data structure element including a LINKCHART field ~~for each transaction line, the LINKCHART field specifying an index of an associated pointer in a~~ storing the associated LINK vector element sequential number, each ~~pointer~~ element of the LINK vector ~~indicating a~~ being the central memory address of ~~a corresponding element in the~~ trial balance data structure elements.

52. (Currently amended) A computer readable medium encoded with software, that when executed by a processor, causes the processor to carry out a process for building financial statements, the process comprising:

receiving accounting data in an electronic file ~~from an accounting system, the~~ ~~accounting data including trial balance data~~ having a plurality number of accounts, wherein each account has a corresponding amount and an accounting direction of said amount;

computing an account balance resulting from one or more transactions, and each transaction is associated with more than one account and combines at least one debit and at least one credit;

grouping the accounts into one or more financial statement items, wherein each account is associated with only one financial statement item within any one financial statement and wherein said grouping is regardless of an account sequence;

computing a financial statement item balance for each financial statement item based on the associated accounts and their respective account balances;

grouping the financial statement items into one or more totals, wherein each total is based on preceding financial statement item balances; and

providing a financial statement that includes each financial statement item and its respective balance.

53. (Currently amended) A computer readable medium encoded with software, that when executed by a processor, causes the processor to carry out a process for building financial statements, the process comprising:

receiving accounting data from an electric file ~~an accounting system, the accounting data including trial balance data~~ having a plurality ~~number~~ of accounts, wherein each account has a corresponding amount and an accounting direction of said amount;

computing an account balance resulting from one or more transactions, and each transaction is associated with more than one account and combines at least one debit and at least one credit;

grouping the accounts into one or more financial statement items, wherein each account is associated with only one financial statement item within any one financial statement and wherein said grouping is regardless of an account sequence;

computing a financial statement item balance for each financial statement item based on the associated accounts and their respective account balances;

storing the financial statement items into a financial statement data structure, the financial statement data structure including a LINE type field for each line of a financial statement, each LINE type field specifying a type attributed to the corresponding financial statement line, with the types including a financial statement item type to designate financial statement items and a total type to designate financial statement items grouped into a total; and providing the financial statement that includes each financial statement item and its respective balance.

54. (Currently amended) A computer readable medium encoded with software, that when executed by a processor, causes the processor to carry out a process for building financial statements, the process comprising:

receiving an electronic file of accounting data ~~from an accounting system, the accounting data including trial balance data~~ having a plurality number of accounts, wherein each account has a corresponding amount and an accounting direction of said amount;

computing an account balance resulting from one or more transactions, and each transaction is associated with more than one account and combines at least one debit and at least one credit;

dynamically allocating central memory spaces for a trial balance data structure for storing the accounts of the accounting data, and linking elements of the trial balance data structure with a doubly linked list of pointers thereby allowing sub-lists of pointers to group the accounts into financial statement items, wherein each account is associated with only one financial statement item within any one financial statement and wherein said grouping is regardless of an account sequence;

computing a financial statement item balance for each financial statement item based on the associated accounts and their respective account balances;

dynamically allocating central memory spaces for a financial statement data structure for storing the financial statement items, and linking elements of the financial statement data structure with a doubly linked list of pointers thereby allowing sub-lists of pointers to group financial statement items into totals; and providing a financial statement that includes each financial statement item and its respective balance.

55. (Currently amended) A computer readable medium encoded with software, that when executed by a processor, causes the processor to carry out a process for organizing accounting data in data structures used for building financial statements, the process comprising:

receiving an electronic file of accounting data, the accounting data including a plurality of accounts, wherein each account has an amount and an accounting direction of said amount;

dynamically allocating central memory spaces for a trial balance data structure for storing accounts included in the accounting data, and linking elements of the trial balance data structure with a doubly linked list of pointers thereby allowing sub-lists of pointers to group the accounts into financial statement items, wherein each account is associated with only one financial statement item within any one financial statement and has a ~~corresponding~~ computed account balance resulting from one or more transactions, and each transaction is associated with more than one account and combines at least one debit and at least one credit;

dynamically allocating central memory spaces for a financial statement data structure for storing the financial statement items, and linking elements of the financial statement data structure with a doubly linked list of pointers thereby allowing sub-lists of pointers to group financial statement items into totals; and storing financial statement items into the financial statement data structure, the financial statement data structure including a LINE type field for each line of a financial statement, each LINE type field specifying a type attributed to the

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corresponding financial statement line, the types including a financial statement item type and a total type.